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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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Piers J. Daniell

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EXAMINER

RAO, ANAND SHASHIKANT

ART UNIT

PAPER NUMBER

2621

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
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3 MONTHS

03/05/2007

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary	Application No. 10/699,044	Applicant(s) DANIELL, PIERS J.	
	Examiner Andy S. Rao	Art Unit 2621	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date ____ | 6) <input type="checkbox"/> Other: ____ |

DETAILED ACTION

Specification

1. The lengthy specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 1-20 are rejected under 35 U.S.C. 102(b) as being anticipated by Hurst, Jr. (hereinafter referred to as "Hurst").

Hurst discloses a digital television (Hurst: column 1, lines 10-20; figure 3, element 120), comprising: a tuner for receiving an MPEG transport stream having at least one program stream (Hurst: column 6, lines 14-20) comprised of "I", "P" and "B" frames (Hurst: column 1, lines 35-52); a transport stream decoder for decoding (Hurst: column 6, lines 50-57) said at least one program stream from said MPEG transport stream (Hurst: column 2, lines 1-13); a program memory for buffering "I" and "P" frames of said at least one program stream (Hurst: column 6, lines 60-67); an "I" frame tracker for tracking the memory location of the last "I" frame of said at least one program stream (Hurst: column 7, lines 1-5); a program selector for selecting said buffered "I" and "P" frames from said program memory, wherein said program selector receives

Art Unit: 2621

the location of the last "T" frame of said at least one program stream from said "T" frame tracker when the program is selected (Hurst: column 5, lines 40-60), and wherein said program selector outputs a sequence of frames starting from that last "T" frame (Hurst: column 7, lines 1-10); a program stream decoder for decoding said sequence of frames (Hurst: column 7, lines 25-30); and a display for imaging said decoded sequence of frames (Hurst: figure 3, element 120), as in claim 1.

Regarding claims 2-3, Hurst discloses a channel controller for selecting said sequence of frames (Hurst: column 5, lines 35-45), as in the claims.

Regarding claim 4, Hurst discloses using an electronic program guide for determining which program stream represents an adjacent channel (Hurst: column 2, lines 8-12), as in the claim.

Regarding claim 5, Hurst discloses wherein said sequence of frames begins on an "I" frame (Hurst: column 1, lines 40-45), as in the claim.

Regarding claim 6, Hurst discloses wherein said sequence of frames begins on a "P" frame (Hurst: column 7, lines 1-5), as in the claim.

Regarding claim 7, Hurst discloses wherein said program memory further buffers "B" frames (Hurst: column 1, lines 45-47), as in the claim.

Regarding claim 8, Hurst discloses wherein said sequence of frames begins on a "B" frame (Hurst: column 7, lines 15-20), as in the claim.

Hurst discloses a digital television (Hurst: column 1, lines 10-20; figure 3, element 120), comprising: a first tuner (Hurst: figure 3, element 140A) for receiving a first MPEG transport stream (Hurst: column 6, lines 14-20) having at least a first program stream comprised of "I",

Art Unit: 2621

"P" and "B" frames (Hurst: column 1, lines 35-52); a first program memory for buffering "I" and "P" frames of said first program stream (Hurst: column 6, lines 60-67); a second tuner (Hurst: figure 3, element 140B) for receiving a second MPEG transport stream (Hurst: column 6, lines 14-20) having at least a second program stream comprised of "I", "P" and "B" frames (Hurst: column 6, lines 35-52); a second program memory for buffering "I" and "P" frames of said second program stream (Hurst: column 6, lines 60-67); an "I" frame tracker for tracking the locations in said first and second program memories of the last "I" frames of both said first and second program streams (Hurst: column 7, lines 1-5); a channel controller (Hurst: column 6, lines 1-10); a program selector for selecting buffered "I" and "P" frames from either said first or from said second program memories (Hurst: column 6, lines 55-65), wherein said program selector's selection is based on signals from said channel controller, wherein said program selector receives the location of the last "I" frame of the program stream in said selected program memory from said "I" frame tracker (Hurst: column 5, lines 40-60), and wherein said program selector produces a sequence of frames starting from the last "I" frame of the program stream in said selected program memory (Hurst: column 7, lines 1-10); a program stream decoder for decoding said sequence of frames (Hurst: column 6, lines 50-57); and a display for producing content represented by said sequence of frames (Hurst: figure 3, element 120), as in claim 9.

Regarding claims 10-11, Hurst discloses wherein the first and second tuners include a decoder for decoding said first and second MPEG transport stream to form said first and second program streams (Hurst: column 1, lines 27-33), as in the claim.

Regarding claim 12, Hurst discloses using an electronic program guide for determining which program stream represents an adjacent channel (Hurst: column 2, lines 8-12), as in the claim.

Regarding claim 13, Hurst discloses wherein said sequence of frames begins on an "I" frame (Hurst: column 1, lines 40-45), as in the claim.

Regarding claim 14, Hurst discloses wherein said sequence of frames begins on a "P" frame (Hurst: column 7, lines 1-5), as in the claim.

Regarding claim 15, Hurst discloses wherein said first and second program memories buffer "B" frames (Hurst: column 1, lines 45-57), as in the claim.

Regarding claim 16, Hurst discloses wherein said sequence of frames begins on a "B" frame (Hurst: column 7, lines 15-20), as in the claim.

Hurst discloses a digital television (Hurst: column 1, lines 10-20; figure 3, element 120), comprising: a tuner for receiving an MPEG transport stream having at least one program stream (Hurst: column 6, lines 14-20) comprised of "I", "P" and "B" frames (Hurst: column 1, lines 35-52); a first transport stream decoder for decoding (Hurst: column 6, lines 50-57) said first program stream from said MPEG transport stream (Hurst: column 2, lines 1-13); a first program memory for buffering "I" and "P" frames of said first program stream (Hurst: column 6, lines 60-67); a second transport stream decoder for decoding (Hurst: column 6, lines 50-57) said second program stream from said MPEG transport stream (Hurst: column 2, lines 1-13); a second program memory for buffering "I" and "P" frames of said second program stream (Hurst: column 6, lines 60-67); an "I" frame tracker for tracking the locations in said first and second program memories of the last "I" frames of both said first and second program streams (Hurst: column 7,

Art Unit: 2621

lines 1-5); a channel controller (Hurst: column 6, lines 1-10); a program selector for selecting buffered "I" and "P" frames from either said first or from said second program memories (Hurst: column 6, lines 55-65), wherein said program selector's selection is based on signals from said channel controller, wherein said program selector receives the location of the last "I" frame of the program stream in said selected program memory from said "I" frame tracker (Hurst: column 5, lines 40-60) , and wherein said program selector produces a sequence of frames starting from the last "I" frame of the program stream in said selected program memory (Hurst: column 7, lines 1-10); a program stream decoder for decoding said sequence of frames (Hurst: column 6, lines 50-57); and a display for producing content represented by said sequence of frames (Hurst: figure 3, element 120), as in claim 17.

Regarding claim 18, Hurst discloses wherein said sequence of frames begins on an "I" frame (Hurst: column 1, lines 40-45), as in the claim.

Regarding claim 19, Hurst discloses wherein said sequence of frames begins on a "P" frame (Hurst: column 7, lines 1-5), as in the claim.

Regarding claim 20, Hurst discloses wherein said first and second program memories buffer "B" frames (Hurst: column 1, lines 45-57), as in the claim.

Conclusion

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Cuccia discloses fast extraction of program specific information from multiple transport streams. O'Callaghan discloses a method and apparatus for video on demand with fast forward, reverse and channel pause. Moeller discloses a video deliver system and method for

Art Unit: 2621

displaying indexing slider bar on the subscriber video screen. Zdepski discloses a system and method for creating trick play video streams from a compressed normal play video bitstream. Devaney discloses apparatus for method for generating a time multiplexed channel surfing signal at television head end sites. Freeman discloses a compressed digital data interactive program system.

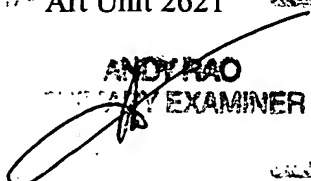
5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Andy S. Rao whose telephone number is (571)-272-7337. The examiner can normally be reached on Monday-Friday 8 hours.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mehrdad Dastouri can be reached on (571)-272-7418. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

asr
March 1, 2007

Andy S. Rao
Primary Examiner
Art Unit 2621


ANDY RAO
PRIMARY EXAMINER